

## REMARKS

By the above amendment, the specification and claims have been amended and new dependent claims 10 - 15 have been presented.

Turning to the amendments to the specification, the second paragraph at page 9 of the specification and the second paragraph at page 21 of the specification have been amended to clarify differences between the materials of the first interlayer insulation layer 14 and that of the second interlayer insulation layer 15. That is, as described in each of these paragraphs, the first interlayer insulation layer is an anodic oxide film, noting that the first full paragraph at page 20 describes the anodization as the first interlayer insulation layer 14. On the other hand, as described at page 9, the second interlayer insulation layer, which is the second interlayer insulation layer 15, is formed by a deposition process which forms, as now recited at pages 9 and 21 of the specification, a non-anodic insulation film, with page 21 pointing out that the insulation film material of the second interlayer insulation layer 15 is a Si oxide or a Si nitride, which are non-anodic insulation films. Accordingly, the specification has been amended to clarify such features and the claims have been amended to utilize the terminology of an anodic oxide film with respect to the first interlayer insulation layer, previously recited in the claims, and a non-anodic insulation film in relation to the second interlayer insulation layer, as recited in the claims, noting that the claims have also been amended to indicate that the non-anodic insulation film is a non-anodic oxide film or a non-anodic nitride film, as described in the specification.

Applicants note that present invention is directed to a cold cathode type flat panel display having a first substrate including thin-film type electron sources, as

illustrated in Figs. 3 and 15, for example. The thin-film type electron sources are arranged in arrays, and each of the thin-film type electron sources include a lower electrode 11, an upper electrode 13, and an electron acceleration layer 12 retained between the lower electrode 11 and the upper electrode 13. Each of the thin-film type electron sources emit electrons from the upper electrode 13 in response to a voltage applied between the lower electrode 11 and the upper electrode 13 wherein, accordance with the present invention, each of the arrays of the thin-film type electron sources include an anodic oxide film 14 and an upper electrode feeder wiring 16 serving as a power feed line to the upper electrode 13, and a non-anodic insulation film 15 provided between the anodic oxide film 14 and the upper electrode feeder wiring 16. As described in the paragraph bridging pages 8 and 9 and the first full paragraph at page 9 of the specification, as well as in the abstract, the second interlayer insulation layer 15 which is a non-anodic insulation film serves to cover defects unevenly distributed in the border between an electron acceleration layer 12 and the anodic oxide film 14 as well as to suppress a time-dependent insulation breakdown. Applicants submit that the aforementioned features are now clearly recited in claims 1 - 9, as amended, and newly presented dependent claims 10 - 15, and such features are not disclosed or taught in the cited art, as will become clear from the following discussion.

As to the rejection of claims 1 - 9 under 35 USC §102(b) as being anticipated by Japanese Patent Application No. JP 2001-084891 to Kusunoki et al, this rejection is traversed insofar as it is applicable to the present claims, and reconsideration and withdrawal of the rejection are respectfully requested.

As to the requirements to support a rejection under 35 USC 102, reference is made to the decision of In re Robertson, 49 USPQ 2d 1949 (Fed. Cir. 1999), wherein

the court pointed out that anticipation under 35 USC §102 requires that each and every element as set forth in the claim is found, either expressly or inherently described in a single prior art reference. As noted by the court, if the prior art reference does not expressly set forth a particular element of the claim, that reference still may anticipate if the element is "inherent" in its disclosure. To establish inherency, the extrinsic evidence "must make clear that the missing descriptive matter is necessarily present in the thing described in the reference, and that it would be so recognized by persons of ordinary skill." Moreover, the court pointed out that inherency, however, may not be established by probabilities or possibilities. The mere fact that a certain thing may result from a given set of circumstances is not sufficient.

Turning to the English language Abstract of Kusunoki et al, Kusumoki et al describes "forming an insulating layer by an anodically oxidized film of Al or an Al alloy, and forming a surface side of a protective insulating layer by an anodically oxidized film of Al or an Al alloy." (emphasis added). Furthermore, the Abstract also specifically describes that "an insulating layer of high withstand voltage is formed by anodic oxidation" (emphasis added) and that "a part ... is selectively anodically oxidized thickly to form a protective insulating layer 14. (emphasis added). Thus, assuming arguendo that Kusunoki et al discloses two different insulating layers, as recited in independent claims 1 and 5 of this application, Kusunoki et al only discloses that both of such layers are anodic oxide layers of Al or Al alloy. In contradistinction, each of independent claims 1 and 5 recite the feature of an anodic oxide film and a non-anodic insulation film, with claim 1 further reciting the feature that the non-anodic insulation film is one of a non-anodic oxide film and a non-anodic nitride film, and with dependent claims 10 and 11 and 13 and 14 further defining

such films. Applicants submit that irrespective of the contentions by the Examiner, the features, as now recited in claims 1 and 5, and the dependent claims, are not disclosed by Kusunoki et al in the sense of 35 USC 102, or rendered obvious in the sense of 35 USC 103, such that all claims should be considered allowable thereover.

Regarding dependent claims 2-4 and 9 which depend from claim 1, and dependent claims 6-8 which depend from claim 5, Applicants submit that, in addition to the aforementioned patentable features of claims 1 and 5, which are included in dependent claims 2-4 and 9 and 6-8 respectively, these dependent claims additionally recite specific features of the non-anodic insulation film which also patentably distinguish over Kusunoki. For example, claims 2 and 5 recite, *inter alia*, that "said non-anodic insulation film is made of an insulation film material which can be etched selectively with respect to said lower electrode and said anodic oxide film" (emphasis added). Similarly, claims 3 and 7 recite, *inter alia*, that "a terminal portion of said non-anodic insulation film surrounding said electron emission region has a normal dip shape" (emphasis added.) Consequently, Applicants submit that claims 2-4 and 6-9 patentably distinguish over Kusunoki in the sense of 35 USC § 102 and should be considered allowable thereover.


Similarly, new dependent claims 10-15 which depend from claims 1 and 5, in addition, recite further features of the non-anodic insulation film. For example, claims 13 and 15 recite the feature that "the non-anodic insulation film enables covering of defects of unevenly distributed in a boundary between an electron acceleration layer and the anodic oxide film and enables suppression of a time-dependent insulation breakdown," which features are not disclosed or taught by Kusunoki et al. Accordingly, the newly submitted claims also patentably distinguish over Kusunoki et al and should be considered allowable.

In view of the above Remarks, Applicants submit that all claims present in this Application should now be in condition for allowance, and issuance of an action of favorable nature is courteously solicited.

To the extent necessary, Applicants petition for an extension of time under 37 CFR §1.136. Please charge any shortage in the fees due in connection with the filing of this paper, including extension of time fees, to the deposit account of Antonelli, Terry, Stout & Kraus, LLP, Deposit Account No. 01-2135 (Case: 1113.44721X00), and please credit any excess fees to such deposit account.

Respectfully submitted,

ANTONELLI, TERRY, STOUT & KRAUS, LLP

/Melvin Kraus/   
Melvin Kraus  
Registration No. 22,466

MK/jla  
(703) 312-6600